Plant Selection & Considerations for Rain Gardens

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Design Rule #1: Clean perimeter with well defined edges makes planting look intentional

Slide by:
Betsy Kaemmerlen LEED-AP
Landscape Architect

…messy and untended looks threatening.

Slide by:
Betsy Kaemmerlen LEED-AP
Landscape Architect

...this will be easier to accept.

Slide by:
Betsy Kaemmerlen LEED-AP
Landscape Architect

Design Considerations

-View Corridor/ Interaction

-Sun/Shade Conditions

-Dry/Deep End

-Interest for All Seasons

-Naturalistic or Formal

Photo by: Betsy Kaemmerlen

General Recommendations When Selecting Plants for Rain Gardens:

Less may be more!

Consider how plants will behave in your rain garden

Design for Low Maintenance

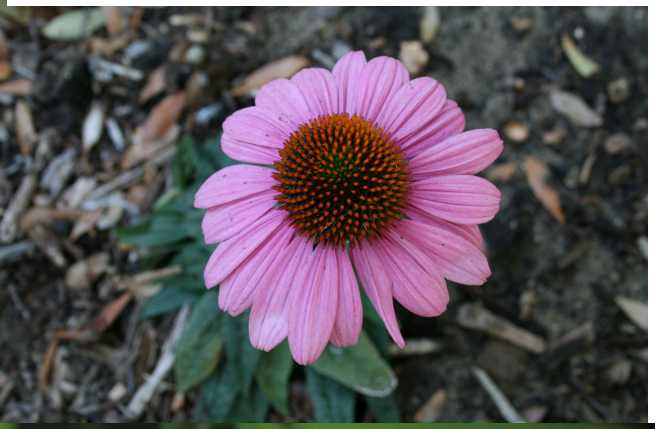
Dwarf Palmetto
Sabal minor

***Hearty species with a range of drought and wet condition tolerance**

Consider Native Plant Species Benefits Include:

- Protect Water Quality
- Combat Invasive Plant Species
- Support Wildlife
- Plant Hardiness
- Sense of Place
- Thrive in Rain Gardens!

Options include small trees, shrubs, perennials, and grasses

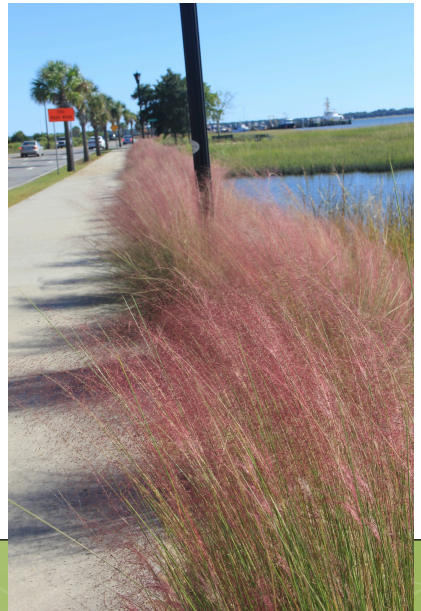


Grasses

Perennials

Shrubs

- Sweetgrass
  Muhlenbergia filipes



Smooth Cordgrass
Spartina alterniflora

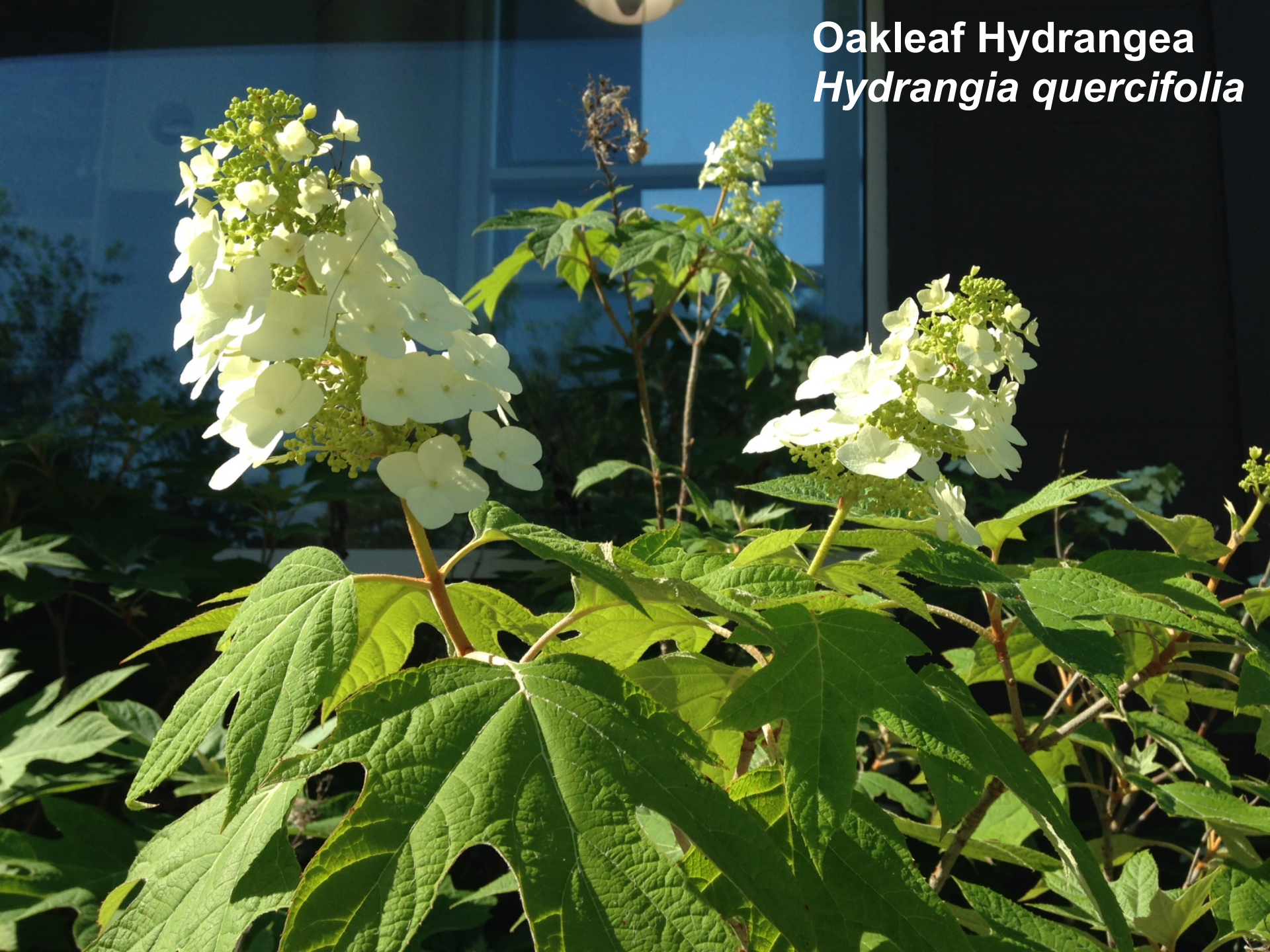
Sand Cordgrass
Spartina bakerri


Black-eyed Susan
Rudbeckia fulgida


Stokes Aster
Stokesia laevis

Purple Coneflower
Echinacea purpurea

Joe-pye weed
Eutrochium fistulosum


Oakleaf Hydrangea
Hydrangia quercifolia

Scarlet hibiscus
Hibiscus coccineus

Marsh Mallow
Hibiscus moscheutos

American Beautyberry
Callicarpa americana

“Wet Feet”

Blue Flag Iris
Iris virginica

Cardinal Flower
Lobelia cardinalis

Other great "Go-to's"

Royal Fern
Osmunda regalis

Blazing Star
Liatris spicata

Blanket Flower
Gallardia pulchella

River Oats
Chasmanthium latifolia

Saw Palmetto
Serenoa repens

- Include both nectar and host larval plant species
- Flowers of different shapes and depths
- Range of colors
- Clump plants in threes or more
- Pick a sunny spot!

Plants that attract butterflies and hummingbirds

Keep in Mind!

- Avoid pesticides
- Leave spaces for butterflies to overwinter-leaf litter, standing perennials

Plant Brainstorming Resources!

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RAIN
GARDENS

A RAIN GARDEN MANUAL FOR SOUTH CAROLINA

GREEN SOLUTIONS TO STORMWATER POLLUTION

As development increases, so does the area of impervious surface. Impervious surfaces include roadways, rooftops, parking lots and sidewalks. Without planning and appropriate management, water that runs over these surfaces picks up pollutants along the way and carries them directly to our lakes, rivers and estuaries. These pollutants include bacteria, nutrients, litter, sediment, oils and metals. Water that heats up on parking lots and roadways also can lead to warmer than normal water entering nearby waterways. This runoff, called "stormwater," is generated by precipitation, snow melt and irrigation water that runs off the land. **Stormwater is the greatest threat to our nation's surface waters.**

As well as creating hard surfaces where pollutants can be washed into waterways, impervious surfaces also prevent the natural infiltration process that occurs in forests, fields and open areas. Instead of adding to the groundwater supply, stormwater flushes the landscape, often leading to increased flooding, erosion, sedimentation and damage to wetlands, ecosystems and waterways.

Rain gardens have become a popular and attractive method for property owners to decrease the impact of their impervious surfaces. Rain gardens are landscaped depressions that receive stormwater runoff and allow the runoff to slowly infiltrate to the groundwater table. As well as intercepting stormwater runoff that could have added to flooding problems, the rain garden allows nature to play a role, removing some of the pollutants that would have otherwise affected water quality. During infiltration, plants use excess nutrients for growth, sediment is trapped in the garden and biological processes remove pathogens. Dissolved metals and nutrients bind or adsorb to soil particles, and are removed temporarily out of the system. Rain gardens, like any garden, also become habitat for bees, birds and butterflies.

Many other stormwater management techniques address only a portion of the problems caused by stormwater runoff. Rain gardens, however, have the potential to solve all of the problems of stormwater runoff before they occur.

Kevin Bautell,
Stormwater, October 2008

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